

CALIFORNIA. ~~STATE~~ BOARD OF HEALTH.

MONTHLY BULLETIN.

Entered as second-class matter August 15, 1905, at the post office at Sacramento, California, under the Act of Congress of July 16, 1894.

Vol. 3.

SACRAMENTO, NOVEMBER, 1907.

No. 6

STATE BOARD OF HEALTH.

MARTIN REGENSBURGER, M.D., <i>President,</i>	F. K. AINSWORTH, M.D.	San Francisco
San Francisco	A. C. HART, M.D.	Sacramento
WALLACE A. BRIGGS, M.D., <i>Vice-President,</i>	O. STANSBURY, M.D.	Chico
Sacramento	W. LE MOYNE WILLS, M.D.	Los Angeles
N. K. FOSTER, M.D., <i>Secretary</i>	Sacramento	
HON. J. E. GARDNER, <i>Attorney</i>	Watsonville	

STATE BUREAU OF VITAL STATISTICS.

N. K. FOSTER, M.D., *State Registrar* .. Sacramento | GEORGE D. LESLIE, *Statistician*

STATE HYGIENIC LABORATORY.

ARCHIBALD R. WARD, D.V.M., *Director*

University of California, Berkeley

NOTICE TO REGISTRARS.

New Numbers for Certificates.—Local Registrars are reminded of the provision of Section 9 of the death registration law requiring them to number original certificates “in consecutive order, beginning with number one for the first death in each calendar year.” After transmitting to the State Registrar certificates for deaths to December 31, 1907, including certificates received by County Record-ers from their subregistrars for deaths to the end of the year, each Local Registrar should start a new series of numbers by putting the figure 1 on the first certificate for a death in 1908 filed with him or received from a subregistrar in January.

Since the death certificates are copied for statistical tabulations made by the Federal Census Bureau, it is necessary that the certifi-cates for each calendar year be kept quite separate in numbering, as specifically required by our State law. County Recorders may delay forwarding the December certificates even after January 5, or until subregistrars will have sent them certificates for all deaths to

the end of 1907. The State Registrar will withhold his approval of fee accounts for the last quarter of 1907 until it appears that certificates for practically all deaths in 1907 have been forwarded to Sacramento.

The same requirement as to the starting of new series of numbers in 1908, of course, applies also to the numbering of certificates of births and marriages in the order in which they are reported to Local Registrars. But as neither the birth nor marriage certificates are copied for the Federal Census Bureau, and as they are indexed separately and systematically in the State Bureau of Vital Statistics, it does not matter much if an occasional birth or marriage taking place late in 1907 is numbered by the Local Registrar in the new series for 1908.

VITAL STATISTICS FOR NOVEMBER.

Summary.—For November there were reported 1,975 living births; 2,545 deaths, exclusive of stillbirths; and 1,843 marriages. For an estimated State population of 2,001,193 these figures give the following annual rates: Births, 12.0; deaths, 15.5; and marriages, 11.2. The corresponding rates for October were 14.2, 14.7, and 11.9.

The November totals for San Francisco were: Births, 373; deaths, 519; and marriages, 376. The totals for the metropolitan area, or "Greater San Francisco," were: Births, 729; deaths, 918; and marriages, 690.

Marriages were reported by counties as follows: San Francisco, 376; Los Angeles, 366; Alameda, 226; Sacramento, 78; Santa Clara, 62; and Fresno, 58.

Births were registered in freeholders' charter cities as follows: San Francisco, 373; Los Angeles, 330; Oakland, 148; Berkeley and Pasadena, each 44; San José, 35; and Alameda, 34.

Deaths occurred as follows in the leading cities: San Francisco, 519; Los Angeles, 331; Oakland, 155; San Diego, 69; Sacramento, 60; Pasadena, 41; Stockton, 37; Alameda, 30; Fresno, 29; San José, 28; and Berkeley, 26.

Causes of Death.—In November there were 399 deaths, or 15.7 per cent of all, from diseases of the circulatory system (heart disease, etc.), and 371, or 14.1 per cent, from tuberculosis of the lungs and other organs. The proportions for both heart disease and tuberculosis were somewhat higher in November than in October.

There were altogether 254 deaths from diseases of the digestive system, 102 being from diarrhea in infants; 252 from violence, 43 being suicides; 238 from diseases of the nervous system, 47 being from meningitis; 237 from diseases of the respiratory system, 168 being from pneumonia; and 137 each from cancer and from Bright's disease.

Altogether 174 deaths were due to epidemic diseases. Among these typhoid fever led with 63 deaths, followed by diphtheria and croup, 49, and plague, 15.

The following table gives the number of deaths from certain principal

causes for November, as well as the proportions from each cause per 1,000 total deaths for both November and October:

Cause of Death.	Deaths: November.	Proportion per 1,000.	
		November.	October.
ALL CAUSES.....	2,545	1,000.0	1,000.0
Typhoid fever.....	63	24.8	20.3
Malarial fever.....	5	2.0	4.4
Smallpox.....	1	0.4	0.4
Measles.....	9	3.5	4.4
Scarlet fever.....	3	1.2	0.8
Whooping-cough.....	7	2.8	6.4
Diphtheria and croup.....	49	19.3	15.2
Influenza.....	9	3.5	4.0
Plague.....	15	5.9	10.4
Other epidemic diseases.....	13	5.1	4.4
Tuberculosis of lungs.....	326	128.1	125.7
Tuberculosis of other organs.....	45	17.7	14.8
Cancer.....	137	53.8	49.5
Other general diseases.....	95	37.3	34.3
Meningitis.....	47	18.5	19.1
Other diseases of nervous system.....	191	75.0	81.8
Diseases of circulatory system.....	399	156.8	144.8
Pneumonia and broncho-pneumonia.....	168	66.0	63.8
Other diseases of respiratory system.....	69	27.1	26.3
Diarrhea and enteritis, under 2 years.....	102	40.1	36.3
Diarrhea and enteritis, 2 years and over.....	28	11.0	7.6
Other diseases of digestive system.....	124	48.7	55.9
Bright's disease and nephritis.....	137	53.8	57.1
Childbirth.....	23	9.0	7.2
Diseases of early infancy.....	80	31.4	32.7
Suicide.....	43	16.9	18.7
Other violence.....	209	82.1	96.2
All other causes.....	148	58.2	57.5

Geographic Divisions.—The table below shows the number of deaths from main classes of diseases in the several geographic divisions of the State for November:

Geographic Division.	DEATHS: NOVEMBER.									
	All Causes.....	Epidemic Diseases.....	Tuberculosis (All Forms).....	Cancer.....	Diseases of Nervous System.....	Diseases of Circulatory System.....	Diseases of Respiratory System.....	Diseases of Digestive System.....	Violence.....	All Other Causes.....
THE STATE.....	2,545	174	371	137	238	399	237	254	252	483
Northern California.....	297	16	37	17	28	47	27	33	36	56
Coast counties.....	142	6	21	7	16	24	13	18	13	24
Interior counties.....	155	10	16	10	12	23	14	15	23	32
Central California.....	1,517	116	196	88	140	250	140	152	144	291
San Francisco.....	519	38	69	46	35	90	45	53	38	105
Other bay counties.....	399	38	54	16	30	65	40	33	44	79
Coast counties.....	179	7	18	8	24	34	11	26	19	32
Interior counties.....	420	33	55	18	51	61	44	40	43	75
Southern California.....	731	42	138	32	70	102	70	69	72	136
Los Angeles.....	513	31	104	26	43	66	57	49	44	93
Other counties.....	218	11	34	6	27	36	13	20	28	43
Northern and Central California.....	1,814	132	233	105	168	297	167	185	180	347
Metropolitan area.....	918	76	123	62	65	155	85	86	82	184
Rural counties.....	896	56	110	43	103	142	82	99	98	163

HEALTH ASSOCIATION MEETING.

The Southern California Public Health Association held its semi-annual meeting in Riverside, December 7th. The following was the program, and was closely followed:

PLAGUE.

Pathology and Bacteriology,

DR. W. M. HORTON,
City Bacteriologist, Los Angeles.

Symptomatology, Clinical Diagnosis and Treatment,

DR. L. M. POWERS,
City Health Officer, Los Angeles.

Quarantine and Prophylaxis,

DR. RUPERT BLUE,
P. A. Surgeon U. S. Public Health and
Marine Hospital Service, San Francisco.

Discussion,

Opened by DR. N. K. FOSTER,
Secretary State Board of Health.

The papers were able and interesting, and were listened to by nearly all the health officers of Southern California.

The pictures of plague cases were drawn so fully and carefully, the methods of diagnosis so closely stated by men who have had experience, that the health officers of the south will have very little trouble in recognizing a case, should it appear. The question of quarantine and prophylaxis was ably handled by Dr. Blue, and if his recommendations and suggestions are carried out there is little fear that the disease will get any foothold in that part of the State.

The attendance was remarkably good, embracing representatives of all the principal towns in the south, and the interest shown is proof of their enterprise and ability.

PLAGUE.

Since the last issue of the Bulletin the work of eradicating plague has been pushed energetically all along the line, as far as the health departments are concerned. The General Government has taken a far greater share of the work in San Francisco, relieving that stricken city of much of the financial strain, but the city authorities are by no means idle. They are efficient and active, and are doing all they can to put to rights the bad sanitary conditions left by the fire.

The epidemic, as such, began August 12th, although one case had been found May 27th. The verified cases by months are as follows: August 13, September 45, October 29, November 21, and the first half of December 6, making 109 in all, or 108 in a little over four months, with 70 deaths. This shows a maximum number of cases in September and a steady decrease since, and we have every reason to believe that the decrease will be steady, although it is quite probable that owing to some new foci some month may go higher than its predecessor.

The area of infection, as marked by the human cases, is, of course, more extensive than at first, but it is doubtful if rat infection is much if any more so, although the constant warfare on them is disturbing and keeping them on the move.

In Oakland there have been to date 9 cases, the last one November 12th, with 6 deaths. This shows remarkably good work on the part of the authorities there. Dr. J. D. Long, of the United States Public Health and Marine Hospital Service, has charge of that side of the

bay, and his organization is complete. He has the full support of the city government, and what is equally as valuable, the people are with him.

Berkeley and Alameda, on either side of Oakland, are doing no effective work, and cases may be expected there, especially in Berkeley, where two have already died. Should it break out in that city it might seriously affect the State University—probably not to the extent of closing it, but certainly greatly lessening its attendance and influence.

All vessels are still being fumigated every fourteen days for the destruction of rats, and State inspectors are examining all dead bodies in the counties surrounding the bay, so that there is small chance for cases to be missed.

While the health departments are doing all they can to stamp out the disease and close every gap in their defense of the rest of the State and of the other States, the people of some of the infected cities sit calmly by, apparently oblivious of the fact that their cities are infected with a terrible disease. The blame for this apathy must lie upon the shoulders of those newspapers which have persisted in either denying the existence of the disease, or minimizing the danger. It is true we will never suffer such an epidemic as exists in India, where over 400,000 died from May to October, but it is the same disease, and our apparent greater immunity is only our better sanitary conditions and greater intelligence. The people will finally awaken to the situation, despite those who are trying to blind their eyes, and then the plague will quickly be stamped out. Meantime, the work must go on by the health departments, no matter what the opposition or how much they are traduced. There can be no compromise with plague.

As long as there is an infected rat left every person's life is in danger from it, for no one can tell into whose house it will go to die. Our only safety is in extermination, and this must be the work of the people in coöperation with the health authorities. The quicker they awaken to a realizing sense of their danger and responsibility, the better.

The eastern states and the counties outside the infected area have no disposition to act in haste or unkindly, and have full faith in the health departments, but they are keenly watching the situation, and when they come to realize that the people are not properly supporting the health departments, they can be little blamed if they consider the breaking off of business and social relations. This is something that is greatly to be deplored and something that need not be, but to avoid it will call for honest work and full publicity. Once before the policy of hiding the truth caused this State to be quarantined by some eastern states, and only a reversal of that policy stopped it from becoming general.

The health authorities have the disease well in hand and only need the proper backing of the press and people to remove all danger.

MUNICIPAL SANITATION.

"Such sanitation as is based on well-formulated principles is really the baby in the family of science." It was born, in fact, with Pasteur's demonstration that germs are the essential causes of infections, and with his declaration that it is within human power to banish all parasitic diseases from the face of the earth. Since his pronouncements the sanitation of large communities has been well-nigh revolutionized, as one may be convinced by Henry Jephson's superb work on "The Sanitary Evolution of London," whose history in this respect is typical of every modern city.

Jephson recounts the memorable meeting held in 1850 to discuss how the dreadful and steadily increasing death-rate of London could be checked. On this occasion

Charles Dickens declared he knew of many places in that city which were "unsurpassed in the accumulated horrors of their long neglect by the dirtiest old towns under the worst old governments in Europe." It was no uncommon thing to find three or four families stye together in a room less than twelve feet square, when few houses had sewerage, and fewer still had a water supply, and even this was from the contaminated Thames. At this meeting there were those who actually had the temerity to declare that landlords should introduce water and sewer pipes into their houses and make their premises decently clean. It outraged the British sense of fair play that a man should be compelled to reduce the income from his property, even if tenants were dying off through his neglect. Since that memorable meeting the gains made in municipal sanitary science have been very encouraging. Truly, even now, "vested interests," often backed in the ghastliest way by ecclesiastical influences, fight bitterly against the most righteous and humane reforms. Many compromises have still to be made with "disease, dirt and the devil"; temporary expedients require to be resorted to until public opinion will permit radical and really adequate measures.

Nevertheless, despite all these deterrents, sanitary science may well be proud of her achievements: Epidemics which used to be so fatal and so widespread are now known only by tradition. The problems of supplying food and pure water and of removing waste are being met on a prodigious scale. Municipal authorities are insisting on wholesome milk and are penalizing culprits in this regard. The spread of tuberculosis is being markedly checked by means of the registration of cases which health departments require. Tenement house departments are bringing about reforms which are humanitarian in the loftiest sense of the term.

We find modern cities crowded to-day in a way quite unprecedented; statistics show, for instance, that New York contains districts more densely populated than any other known region of equal area. But this, as Woodruff points out, is really a compliment to modern sanitary science, which has made possible the building of higher houses by adequate systems of plumbing and by the introduction of sewerage facilities into streets. Thus ten times or a hundred times the number of people can live in fair health in a place which was formerly fatal.

Sanitary science has purified rivers and closed infected wells (although we do still have our unnecessary typhoid epidemics); it has torn down houses, widened streets, built gigantic sewers, eliminated in great degree noxious trades, ventilated factories, purified bakeries and compelled pure food laws.

Practically all the large towns in the United States are in process of rebuilding, and it is most gratifying to observe how architects, builders, and contractors on public works are earnestly consulting sanitarians in order that their combined labors may yield results both enduring and salutary. And model tenements are no longer the fad; they have become a municipal commonplace. "Philanthropy with four per cent" is not only wholesome altruism; it has become legitimate business propositions in Chicago, Boston, New York, Philadelphia, Washington, and other large cities. We as physicians can not but exult in these measures making for prophylaxis and the betterment of the race; they content us mightily, however much they curtail our incomes.

The foregoing editorial is from the Journal of the American Medical Association of November 30, 1907, and indicates the progress of sanitation. Not only here on the Pacific Coast, but in inland and Eastern cities, there is one thing in our rebuilding that has not received its due consideration. Every basement should be, yes, must be, made rat proof. Of course, the same cry of expense and decreased incomes will be heard, but when rats and mice are driven from the habitation of man, and the disease and destruction of property they cause is placed in the balance against the cost, it will be seen that the investment even from a financial standpoint is advantageous.

These vermin carry disease, notably plague, and as a sanitary measure must be destroyed or driven from our houses. This is almost impossible so long as they have good places to hide and breed in basements and between partitions. Every city should pass laws requiring that every building, no matter for what purpose, should have a solid, rat-proof foundation reaching two feet under ground and one foot above. The walls should also be made rat proof so that these vermin can not get into partitions. Stables must have concrete floors, and then we can expect, with some degree of certainty, extermination of the rats, and another step will have been taken to lessen sickness and our incomes.

DUTIES OF THE PHYSICIAN IN TYPHOID.

Dr. Long, County Health Officer of Fresno County, in his monthly report to the Supervisors, has the following:

Dr. Nicholson of Oleander reported four cases of typhoid fever in one family near his place. One member of the family had contracted the disease in Sugar Pine, Madera County, bringing it home with him, and by this means the others of the family were taken down with the disease.

This is by no means an isolated case, but is of common occurrence. One member of the family comes home with typhoid fever and others who had not been away from home come down in due time, having contracted the disease from the first case. This should not be, and would not be if proper care had been taken.

People, as a rule, are not properly informed as to the communicability of typhoid fever. It is not considered contagious as that word is generally accepted, but it is communicable to a high degree. The discharges from the body are full of the typhoid bacilli, and it is hardly a possible thing to care for a typhoid patient without getting the infected material upon the hands, and from there it is easily conveyed to the mouth, or oftentimes to food. There is no doubt that typhoid is a water-borne disease, but equally true that it is very frequently spread by contact. The ideal way to care for typhoid patients is to isolate them and have a trained nurse, but that is often impossible, and the care falls upon some member of the family, either wife, mother, or sister, who is also cook and housekeeper, and therein lies the danger. Not knowing that all the discharges from the body are filled with disease germs, and that even by taking the patient's hand in hers she might become infected, she takes no particular care. Again, the discharges are left where flies can light upon and carry the infected matter to food or dishes.

There are few cases of typhoid that do not have a physician, and upon him lies the duty of giving proper instructions to the family and nurse. He should see that all discharges from the patient are at once destroyed. They should be received into a vessel containing a strong disinfectant, allowed to stand tightly covered for awhile, and buried where there is no possibility of draining into a well or stream. The patient should be frequently washed with a disinfecting solution and all the bedding and clothes changed frequently and at once put into boiling water. All dishes should be put into boiling water before removal, and all food not eaten should be wrapped in paper and burned, not thrown out for cats, dogs, or chickens.

The sick room should never be frequented by the family, and kissing the patient should not be countenanced. The patient's hands are easily soiled and carry to the face the infected matter, which is readily taken by the lips of the kisser.

Flies *must be kept out*, for they are responsible for much of our typhoid. Lighting upon everything filthy and covering themselves with it, they delight to next take a sip of our milk or a promenade on our food, or, becoming more familiar, light upon our lips, with a like result in every case of leaving infection behind.

If physicians will properly instruct patients, friends, and nurses, the number of cases of typhoid in the State can be very materially reduced. Doctors are required to report to health officers all cases of typhoid, and this they should not neglect to do and the health officer in turn should see that proper instructions are given.

INTERNATIONAL CONGRESS ON TUBERCULOSIS.

The International Congress on Tuberculosis will meet in Washington, D. C., September 21 to October 12, 1908. This is the first meeting of the congress in the United States, and it will probably be many years before it will again come here. The General Government has, through the Departments of State, Treasury, War, Navy, Interior, and Agriculture, signified its intention to participate, and the governors of most of the states have taken official notice in favor of the congress.

DATE AND PROGRAM.—The section work of the congress will be done in the week September 28th to October 3d. During that week there will be two general meetings.

During the three weeks September 21st to October 12th a *tuberculosis exhibition* will be open, and a course of *special lectures* by distinguished men will be in progress. *Clinics and demonstrations* of unusual interest will be arranged for the whole period.

THE EXHIBITION.—The exhibition will assemble illustrative materials from all parts of the civilized world. Members of the congress will find many opportunities to acquire or to increase, by exchange or otherwise, a valuable collection of illustrative objects. Literature forms an important part of many exhibits, and much of this literature can be had on the spot, for the asking, or will be sent, on written request, to any address.

PUBLICATIONS.—The papers announced in the official program will be printed in advance, and will be distributed on the day of their presentation. They will be printed in German, French, Spanish, and English.

The proceedings of the congress will be carefully edited and will be published within three months after adjournment.

The section proceedings, with the special lectures, the discussions, and an account of the exhibition, will make four substantial volumes, about 2,000 pages.

MEMBERSHIP.—There are two classes of members: *Active members* pay a fee of five dollars, and they receive, besides the ordinary privileges of membership, the full set of published transactions without extra charge.

Associate members pay a fee of two dollars. They do not receive the published transactions, or vote in the congress. They receive the official badge, and the printed matter distributed during the congress and at the exhibition; they share in the entertainments, attend meetings, clinics, demonstrations, etc., and have the benefit of special transportation and hotel rates.

California should have a large representation at the congress, and a much larger on the membership roll. The chance of meeting the men who have made themselves famous in this work, and of listening to the papers and discussions, should be neglected by no one who can possibly avail himself of the opportunity, and those who can not will find the transactions of far greater value than the five-dollar membership fee.

Membership cards can be obtained by addressing Dr. John S. Fulton, 714 Colorado Building, Washington, D. C., and it is earnestly hoped that health officers and others in California will at once apply for membership. Remember that California has the highest death-rate of any State from tuberculosis, and that our duty demands most active work. While this high death-rate is caused largely by the influx of those already dying with tuberculosis, the fact remains that many native Californians are becoming infected by this constant stream of fresh infection. No better opportunity can be offered than this congress to protest against the injustice to California, as well as to the patient, in sending here each year hundreds who are beyond help, and many of them without proper means of support. California has a climate unexcelled, to which we welcome all who are in a condition to be improved by it, but we want the world to understand that, while we will be kind to the consumptive, we do not welcome those who are past help and who will be subjects for State or municipal aid.